

## MUSEUM OF FINE ARTS

BOSTON, MASSACHUSETTS 02115



Research Laboratory

February 8, 1968

Mr. John J. Ford, Jr.  
 Numismatist  
 176 Hendrickson Avenue  
 Rockville Centre  
 Long Island, New York

Dear Mr. Ford:

As previously stated in my letter of February 5th, the method of analysis was X-ray fluorescence of the obverse and reverse of each coin positioned in the spectrograph and the counts per element registered on a Brown Recorder. Each coin was run five different times with a slightly different position of the surface being exposed to the X-radiation. The five readings were computed and the counts-per-second averaged. They were then calibrated against a 24k gold standard or 100% gold, 18k or 75% gold, along with 14k or 58.33% gold.

From these gold standards working curves were made from the counts-per-second readings and, because of the variations of the surface of the coin, we felt only justified in rounding the figure off to the nearest decimal point, indicating the following analyses:

	<u>Parts per 1000</u>	<u>Parts Silver</u>	<u>Copper</u>	<u>Iron</u>
Coin USAOG-111 Prop. of: Harry J. Forman Philadelphia, Pennsylvania	910	80	---	--- 10 parts not accounted for
Coin USAOG-104 Prop. of: Werner Amelingmeier Merrick, New York	890	90	5-10	--- 10-15
Coin USAOG- Prop. of: Henry H. Clifford Los Angeles, California	880	85	30	Trace 5

Mr. John J. Ford, Jr.:

2

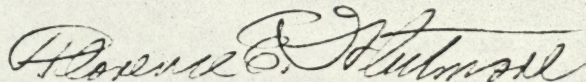
February 8, 1968

Therefore, coin USAOG-111 would indicate 910/1000 fine gold with 80/1000 fine silver.

I feel because five analyses were made on each side of the coin and averaged that the results represent a reasonable analysis of coins. These were then compared with the specific gravity of each coin and I feel a reasonably accurate analysis was obtained.

Hoping you will find the above explanation satisfactory,

Yours truly,

A handwritten signature in cursive script, appearing to read "Florence E. Whitmore".

Florence E. Whitmore  
Technical Assistant

FEW/sbh  
AIR MAIL  
SPECIAL DELIVERY